AMENDMENTS TO THE CLAIMS:

Please amend claim 1-17 as follows:

1. A mechanism for transmitting torque between a shaft ~~(12)~~ and a hub ~~(14)~~ disposed around the shaft ~~(12)~~ while holding a shaft tooth section ~~(22)~~ formed on the shaft ~~(12)~~ and a hub tooth section ~~(28)~~ formed on the hub ~~(14)~~ in engagement with each other, wherein

said shaft tooth section ~~(22)~~ has a straight peak ~~(22a)~~ having a constant tooth thickness and a valley ~~(22b)~~ having an outside diameter varying from an end of the shaft ~~(12)~~ toward a shaft shank ~~(24)~~ of the shaft ~~(12)~~;

said hub tooth section ~~(28)~~ has a straight peak ~~(28a)~~ having a constant tooth thickness and having an inside diameter varying from an end thereof toward said shaft shank ~~(24)~~ and a valley ~~(28b)~~ having a constant inside diameter in the axial direction of the shaft ~~(12)~~; and

said valley ~~(22b)~~ of said shaft tooth section ~~(22)~~ has a first step region ~~(30)~~ raised toward said hub tooth section ~~(28)~~, and said peak ~~(28a)~~ of said hub tooth section ~~(28)~~ has a second step region ~~(32)~~ retracted away from said shaft tooth section ~~(22)~~.

2. A mechanism according to claim 1, wherein a starting point (P1) of said first step region ~~(30)~~ and a starting point (P2) of said second step region ~~(32)~~ are set in respective positions which are offset from each other by a predetermined distance (L4).

3. A mechanism according to claim 1, wherein said first step region ~~(30)~~ of said shaft tooth section ~~(22)~~ has a tilt angle (θ) set to a value ranging from 5 degrees to 45 degrees.

4. A mechanism according to claim 1, wherein said peak ~~(22a)~~ of said shaft tooth

section ~~(22)~~ has an outside diameter which is constant in the axial direction of said shaft ~~(12)~~.

5. A mechanism according to claim 1, wherein said peak ~~(22a)~~ of said shaft tooth section ~~(22)~~ has an outside diameter near and end thereof which gradually decreases toward said shaft shank ~~(24)~~.

6. A mechanism for transmitting torque between a shaft ~~(12)~~ and a hub ~~(14)~~ disposed around the shaft ~~(12)~~ while holding a shaft tooth section ~~(22)~~ formed on the shaft ~~(12)~~ and a hub tooth section ~~(28)~~ formed on the hub ~~(14)~~ in engagement with each other, wherein

said shaft tooth section ~~(22)~~ has a straight peak ~~(22a)~~ having a constant tooth thickness and a valley ~~(22b)~~ having an outside diameter varying from an end of the shaft ~~(12)~~ toward a shaft shank ~~(24)~~ of the shaft ~~(12)~~;

said hub tooth section ~~(28)~~ has a straight peak ~~(28a)~~ having a constant tooth thickness and having an inside diameter varying from an end thereof toward said shaft shank ~~(24)~~ and a valley ~~(28b)~~ having a constant inside diameter in the axial direction of the shaft ~~(12)~~; and

said valley ~~(22b)~~ of said shaft tooth section ~~(22)~~ has an arcuate region ~~(130)~~ having a predetermined radius of curvature and extending toward said hub tooth section ~~(28)~~, and said peak ~~(28a)~~ of said hub tooth section ~~(28)~~ has a step region ~~(132)~~ facing said arcuate region ~~(130)~~ and retracted away from said shaft tooth section ~~(22)~~.

7. A mechanism according to claim 6, wherein a starting point (P1) of said arcuate region ~~(130)~~ joined to the valley ~~(22b)~~ of said shaft tooth section ~~(22)~~ and a starting point (P2) of said step region ~~(132)~~ joined to the peak ~~(28a)~~ of said hub tooth

section ~~(28)~~ are set in respective positions which are offset from each other by a predetermined distance (L2).

8. A mechanism for transmitting torque between a shaft ~~(12)~~ and a hub ~~(14)~~ disposed around the shaft ~~(12)~~ while holding a shaft tooth section ~~(22)~~ formed on the shaft ~~(12)~~ and a hub tooth section ~~(28)~~ formed on the hub ~~(14)~~ in engagement with each other, wherein

said shaft tooth section ~~(22)~~ has a straight peak ~~(22a)~~ having a constant tooth thickness and a valley ~~(22b)~~ having an outside diameter varying from an end of the shaft ~~(12)~~ toward a shaft shank ~~(24)~~ of the shaft ~~(12)~~;

said hub tooth section ~~(28)~~ has a straight peak ~~(28a)~~ having a constant tooth thickness and having an inside diameter varying from an end thereof toward said shaft shank ~~(24)~~ and a valley ~~(28b)~~ having a constant inside diameter in the axial direction of the shaft ~~(12)~~; and

said valley ~~(22b)~~ of said shaft tooth section ~~(22)~~ has a tapered region ~~(230)~~ having a diameter progressively increasing toward said hub tooth section ~~(28)~~, and said peak ~~(28a)~~ of said hub tooth section ~~(28)~~ has a step region ~~(232)~~ facing said tapered region ~~(230)~~ and retracted away from said shaft tooth section ~~(22)~~.

9. A mechanism according to claim 8, wherein a starting point (P1) of said tapered region ~~(230)~~ and a starting point (P2) of said step region ~~(232)~~ are set in respective positions which are offset from each other by a predetermined distance (L2).

10. A mechanism according to claim 8, wherein said tapered region ~~(230)~~ of said shaft tooth section ~~(22)~~ has a rise angle (θ) set to a value ranging from 6 degrees to 65 degrees.

11. A mechanism for transmitting torque between a shaft ~~(12)~~ and a hub ~~(14)~~ disposed around the shaft ~~(12)~~ while holding a shaft tooth section ~~(22)~~ formed on the shaft ~~(12)~~ and a hub tooth section ~~(28)~~ formed on the hub ~~(14)~~ in engagement with each other, wherein

said shaft tooth section ~~(22)~~ has a straight peak ~~(22a)~~ having a constant tooth thickness and a valley ~~(22b)~~ having an outside diameter varying from an end of the shaft ~~(12)~~ toward a shaft shank ~~(24)~~ of the shaft ~~(12)~~, said valley ~~(22b)~~ having a step region ~~(330)~~ raised toward said hub tooth section ~~(28)~~ obliquely at a predetermined angle; and

said hub tooth section ~~(28)~~ has a straight peak ~~(28a)~~ having a constant tooth thickness and a valley ~~(28b)~~, said peak ~~(28a)~~ and said valley ~~(28b)~~ having constant inside diameters from the end toward said shaft shank ~~(24)~~ in the axial direction of the shaft ~~(12)~~.

12. A mechanism according to claim 11, wherein said step region ~~(330)~~ has a tilt angle (θ) set to a value ranging from 5 degrees to 45 degrees.

13. A mechanism for transmitting torque between a shaft ~~(12)~~ and a hub ~~(14)~~ disposed around the shaft ~~(12)~~ while holding a shaft tooth section ~~(22)~~ formed on the shaft ~~(12)~~ and a hub tooth section ~~(28)~~ formed on the hub ~~(14)~~ in engagement with each other, wherein

said shaft tooth section ~~(22)~~ has a straight peak ~~(22a)~~ having a constant tooth thickness and a valley ~~(22b)~~ having an outside diameter varying from an end of the shaft ~~(12)~~ toward a shaft shank ~~(24)~~ of the shaft ~~(12)~~;

said hub tooth section ~~(28)~~ has a straight peak ~~(28a)~~ having a constant tooth

thickness and having an inside diameter varying from an end thereof toward said shaft shank ~~(24)~~ and a valley ~~(28b)~~ having a constant inside diameter in the axial direction of the shaft ~~(12)~~; and

said valley ~~(22b)~~ of said shaft tooth section ~~(22)~~ has a first tapered surface ~~(332)~~ inclined at a predetermined angle.

14. A mechanism according to claim 13, wherein said peak ~~(28a)~~ of said hub tooth section ~~(28)~~ has a second tapered surface ~~(334)~~ facing the first tapered surface ~~(332)~~ of said valley ~~(22b)~~ of said shaft tooth section ~~(22)~~.

15. A mechanism according to claim 13, wherein a starting point (P1) where said first tapered surface ~~(332)~~ starts to rise and a starting point (P4) where said second tapered surface ~~(334)~~ starts to rise are set in respective positions which are offset from each other by a predetermined distance in the axial direction of the shaft ~~(12)~~.

16. A mechanism according to claim 13, wherein said peak ~~(28a)~~ of said hub tooth section ~~(28)~~ has an arcuate surface ~~(336)~~ having a predetermined radius of curvature and retracted away from said shaft tooth section ~~(22)~~.

17. A mechanism according to claim 16, wherein a starting point (P1) where said tapered surface ~~(332)~~ starts to rise and a starting point (P5) where said arcuate surface ~~(336)~~ starts to rise are set in respective positions which are offset from each other by a predetermined distance in the axial direction of the shaft ~~(12)~~.